

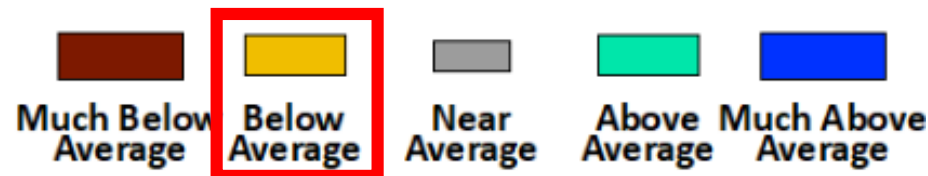
# **Southern Wisconsin Spring Flood Outlook**

**Feb 11, 2022**



**National Weather Service Milwaukee**

# Key Points



- **Spring flood risk is slightly below average across all of southern Wisconsin**
  - Main factors are below normal snow pack and dry soils
  - Additional snow pack will increase this risk
  - Flooding is possible with rain on frozen ground
  - Greatest risk of flooding occurs with snow melt and moderate to heavy rain
- **Break up ice jams possible: Risk is Low to Medium**

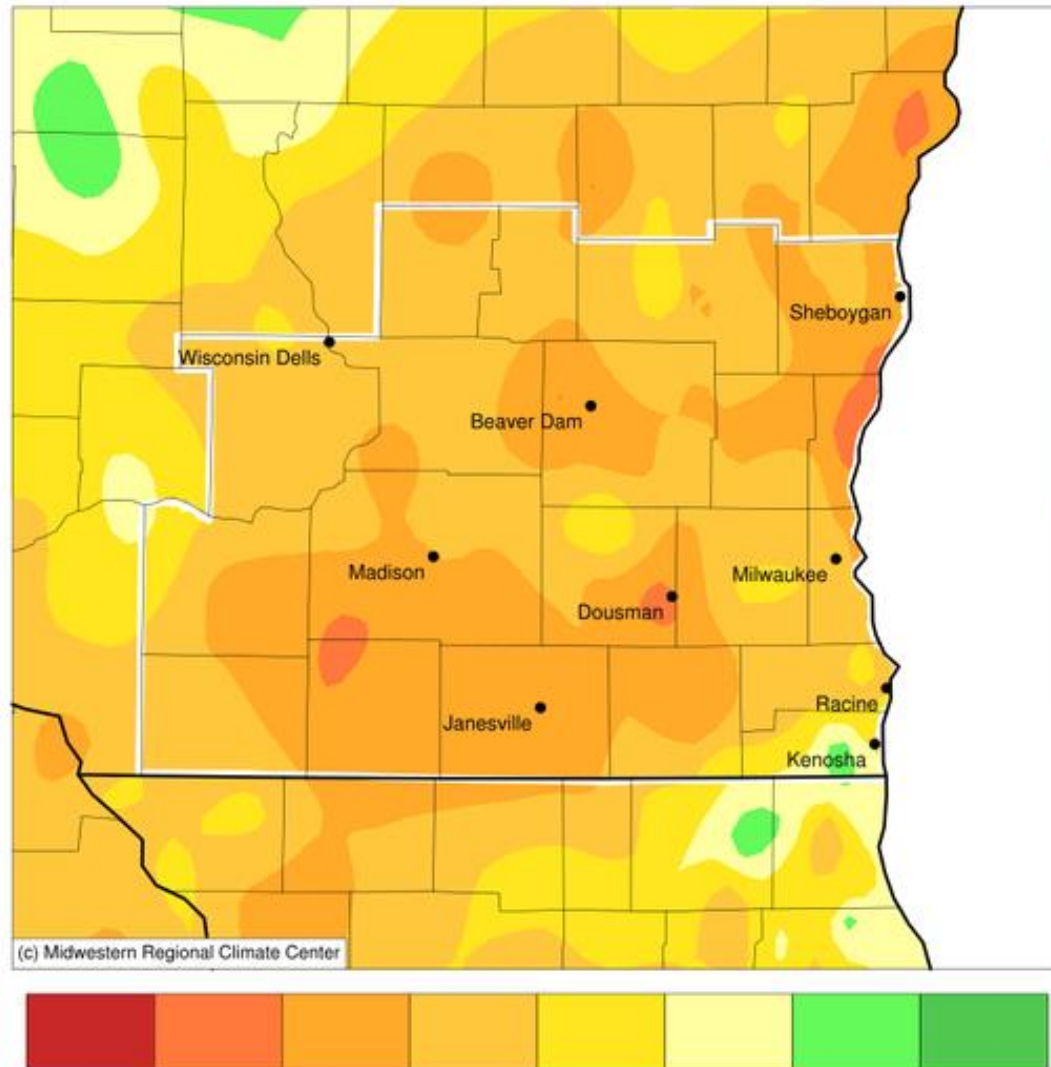


Flood Risk Factor	Status	Risk
Winter Precipitation / Snowpack	Below Average	Lowers Risk
Soil Moisture	Below Average	Lowers Risk
River Levels	Average to Below Average	Little Effect
Frost Depth	Average	Little Effect
Spring Precipitation	?	
Spring Temperatures	?	





# Accumulated Precipitation (in): Departure from 1991-2020 Normals December 01, 2021 to February 07, 2022



(c) Midwestern Regional Climate Center

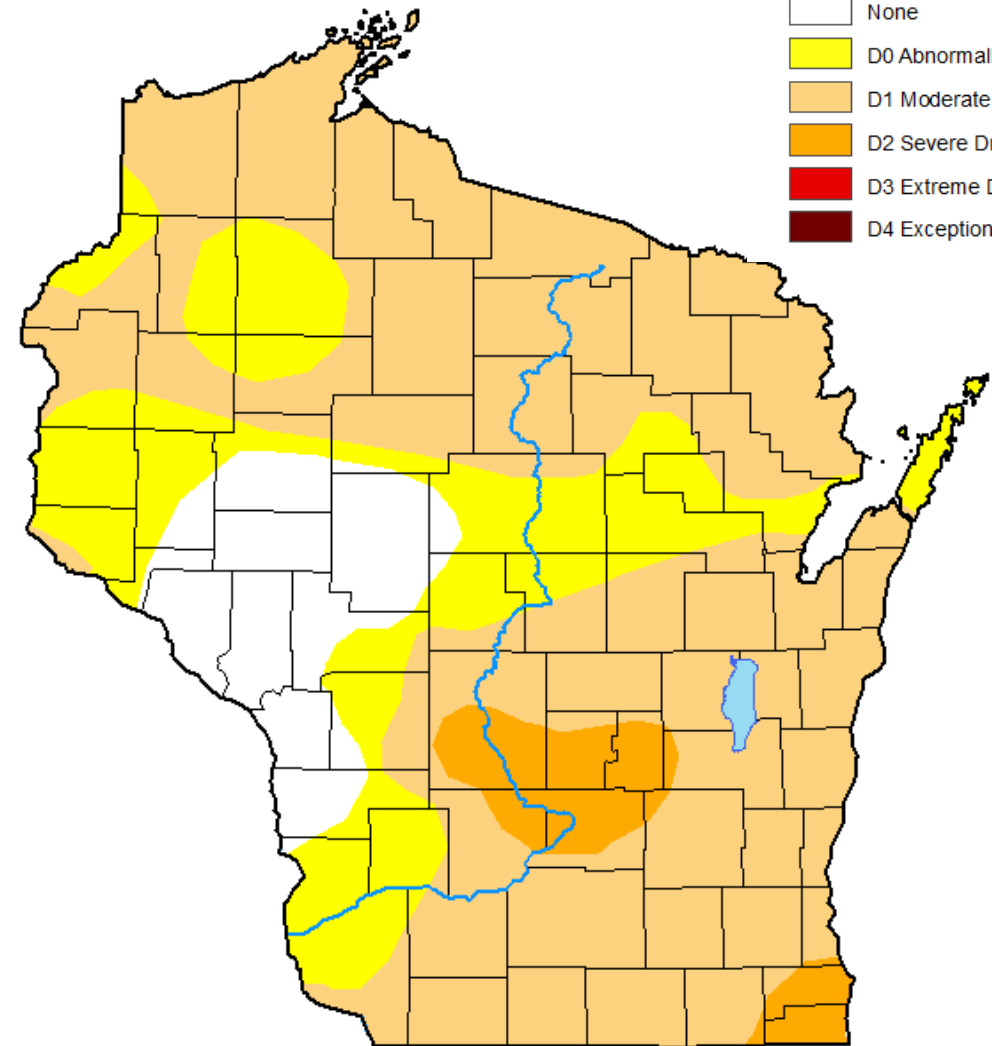


-2.5 -2 -1.5 -1 -0.5 0 0.5  
Stations from the following networks used: WBAN, COOP, FAA, GHCN, ThreadEx, CoCoRaHS, WMO, ICAO, NWSLI, Midwestern Regional Climate Center  
cli-MATE: MRCC Application Tools Environment  
Generated at: 2/7/2022 2:34:55 PM CST

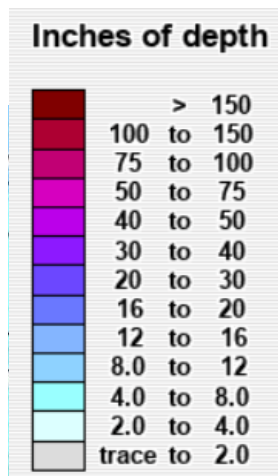
## U.S. Drought Monitor Feb 8, 2022

### Intensity:

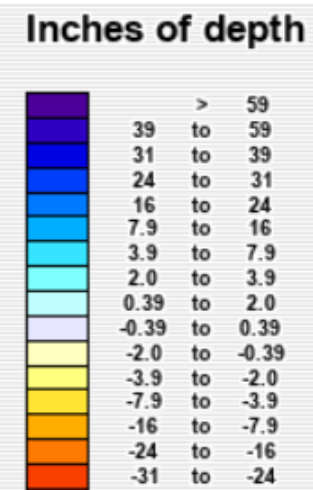
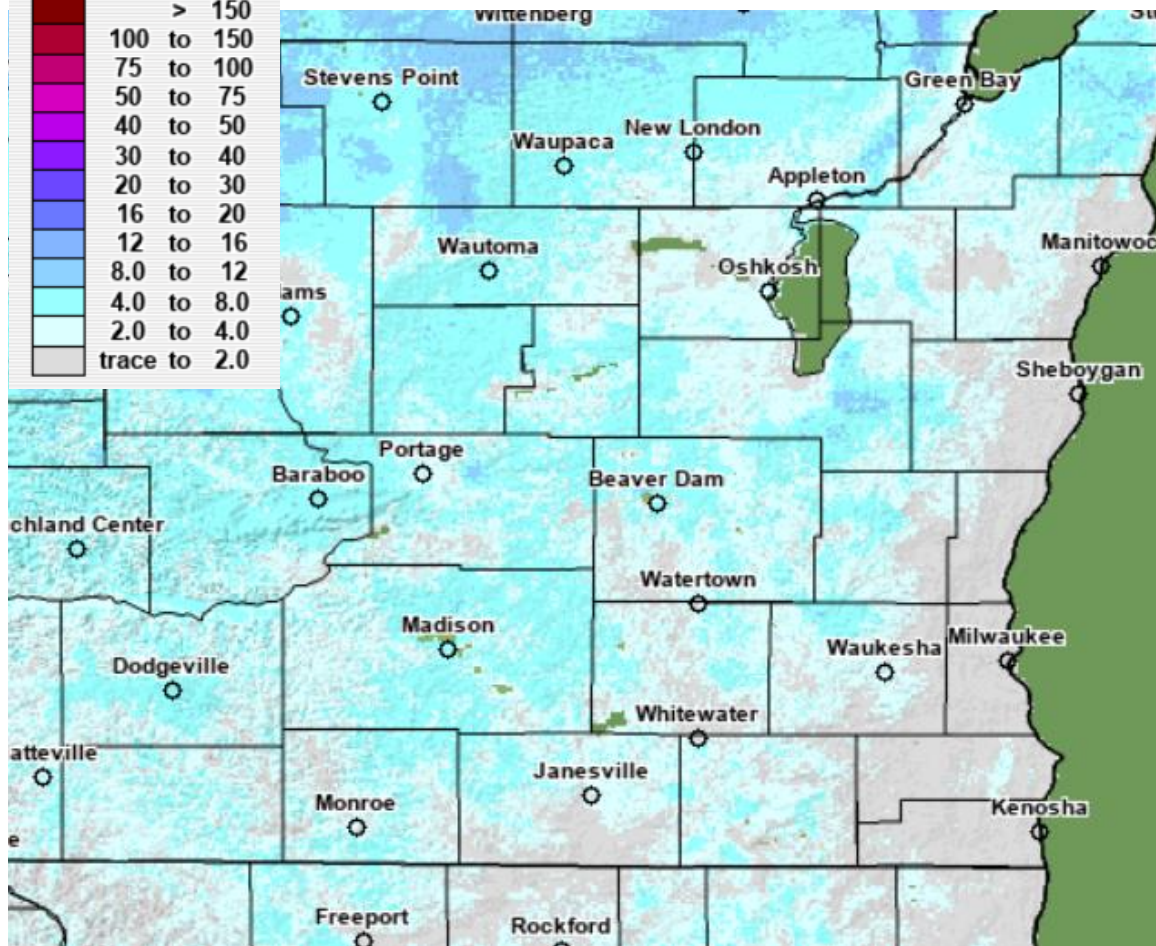
- None
- D0 Abnormally Dry
- D1 Moderate Drought
- D2 Severe Drought
- D3 Extreme Drought
- D4 Exceptional Drought



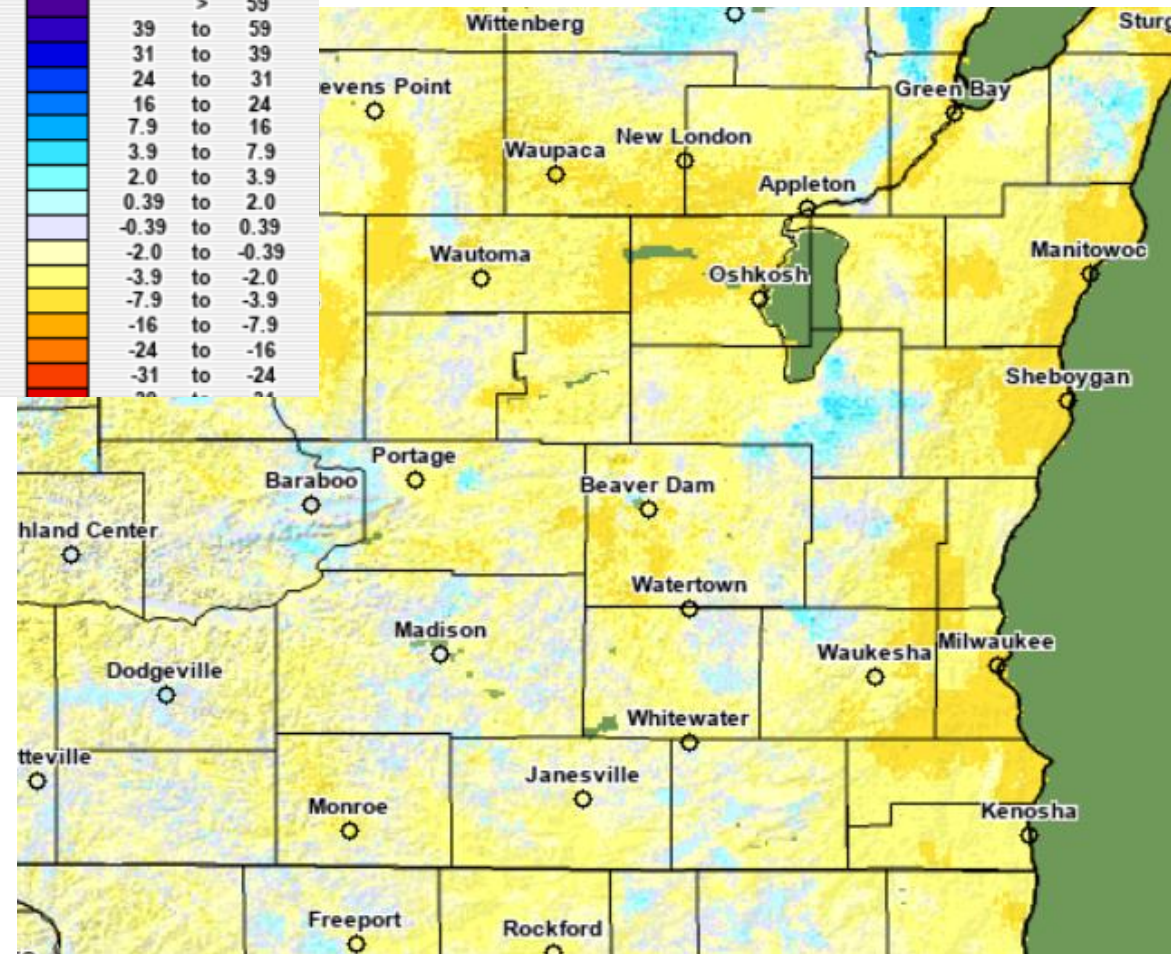
[droughtmonitor.unl.edu](https://droughtmonitor.unl.edu)



Snow Depth (inches) 2/9/2022

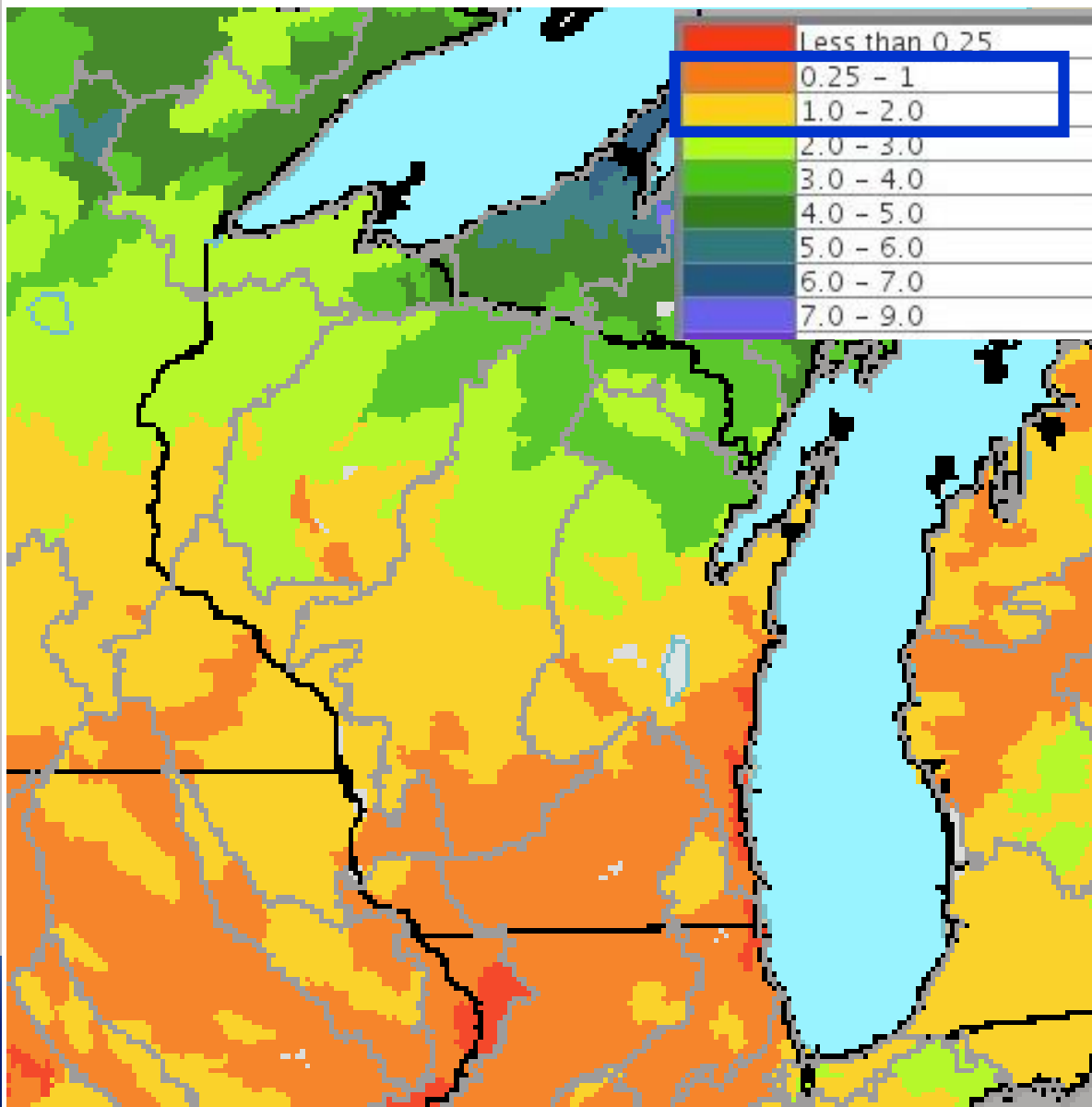


Snow Depth Departure from Normal (inches) 2/9/2022

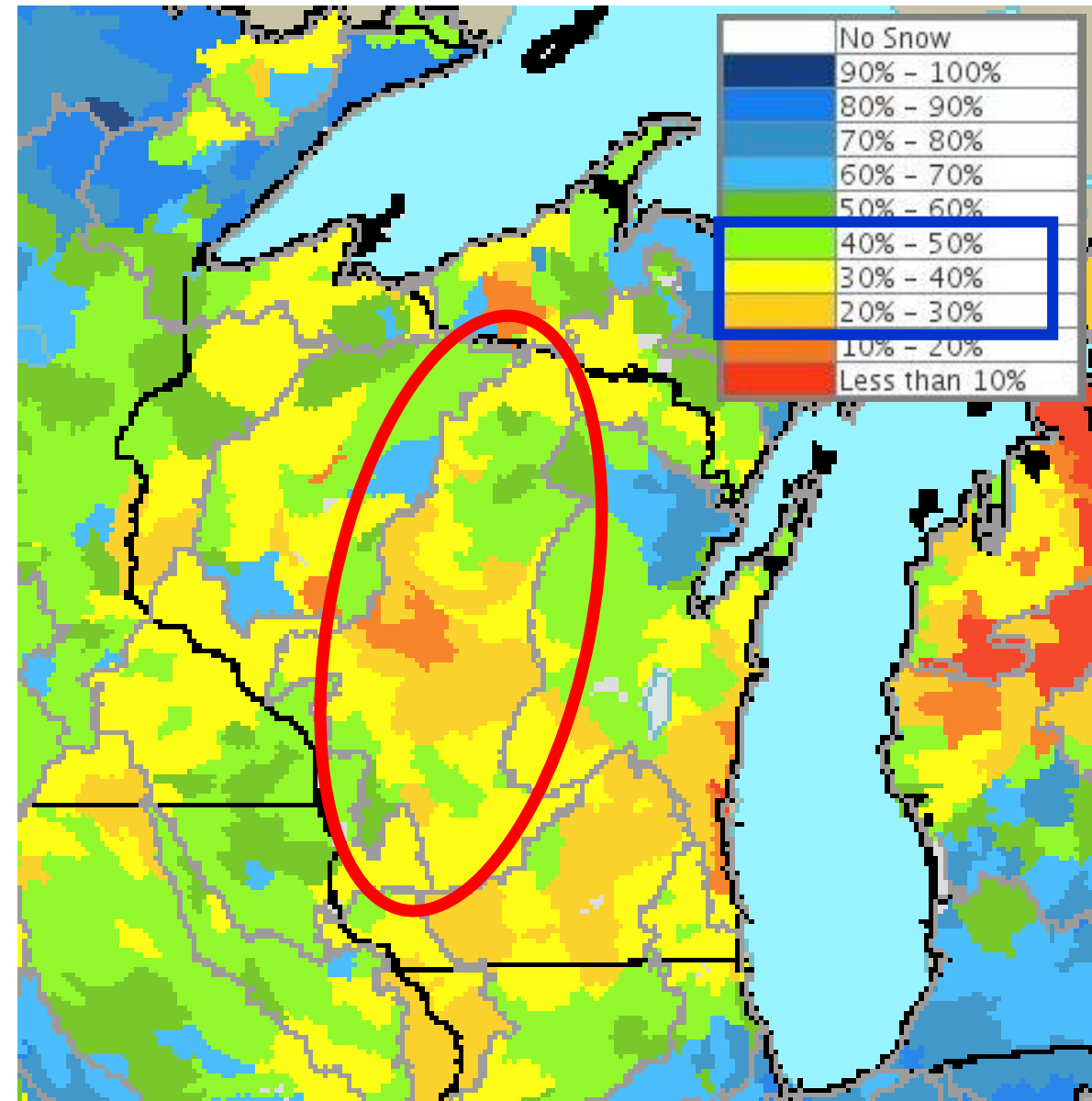




## Snow Water Equivalent (inches) 2/7/2022



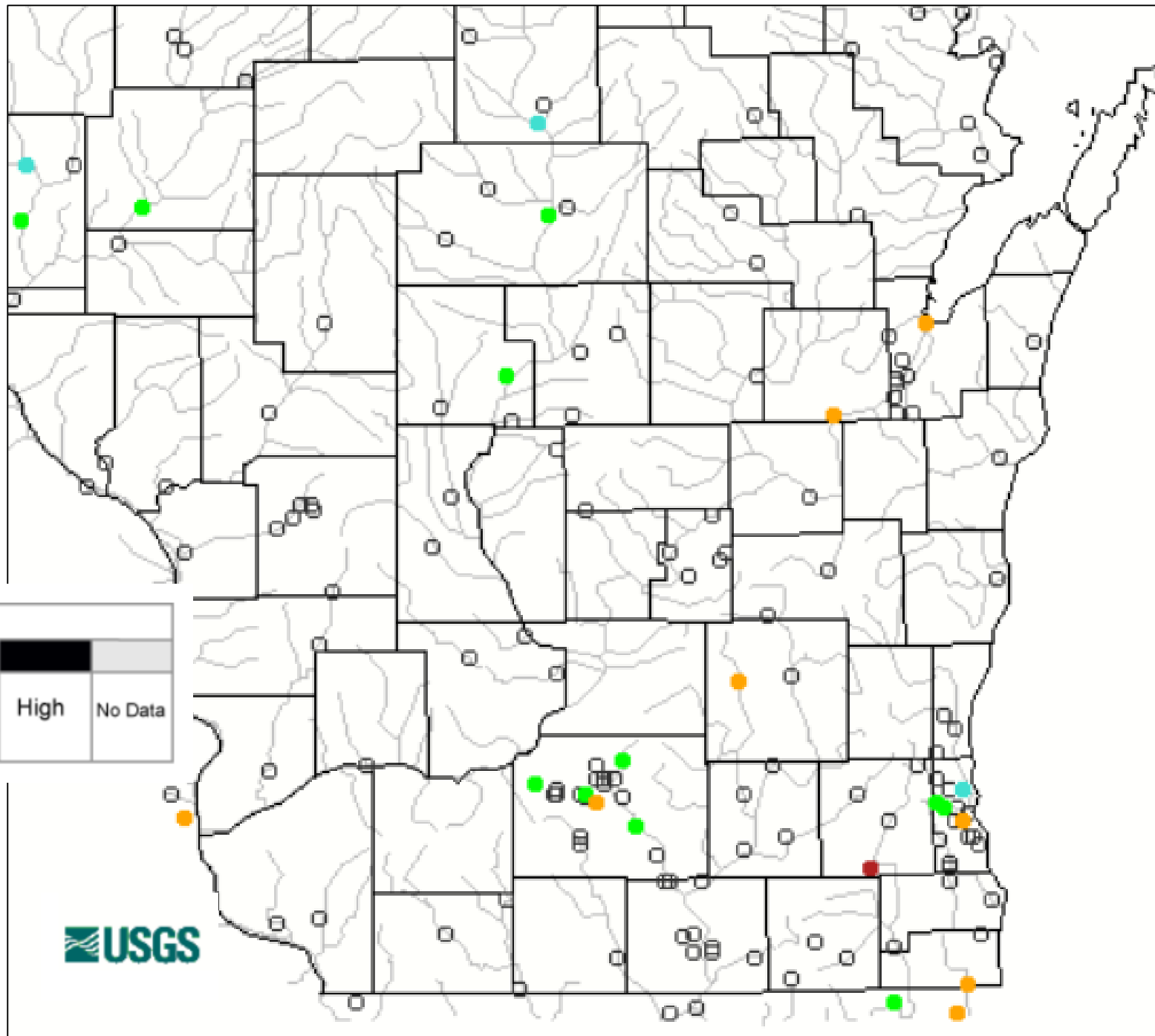
## Snow Water Percentile 2/7/2022



# 14 day Mean Streamflow Percentile

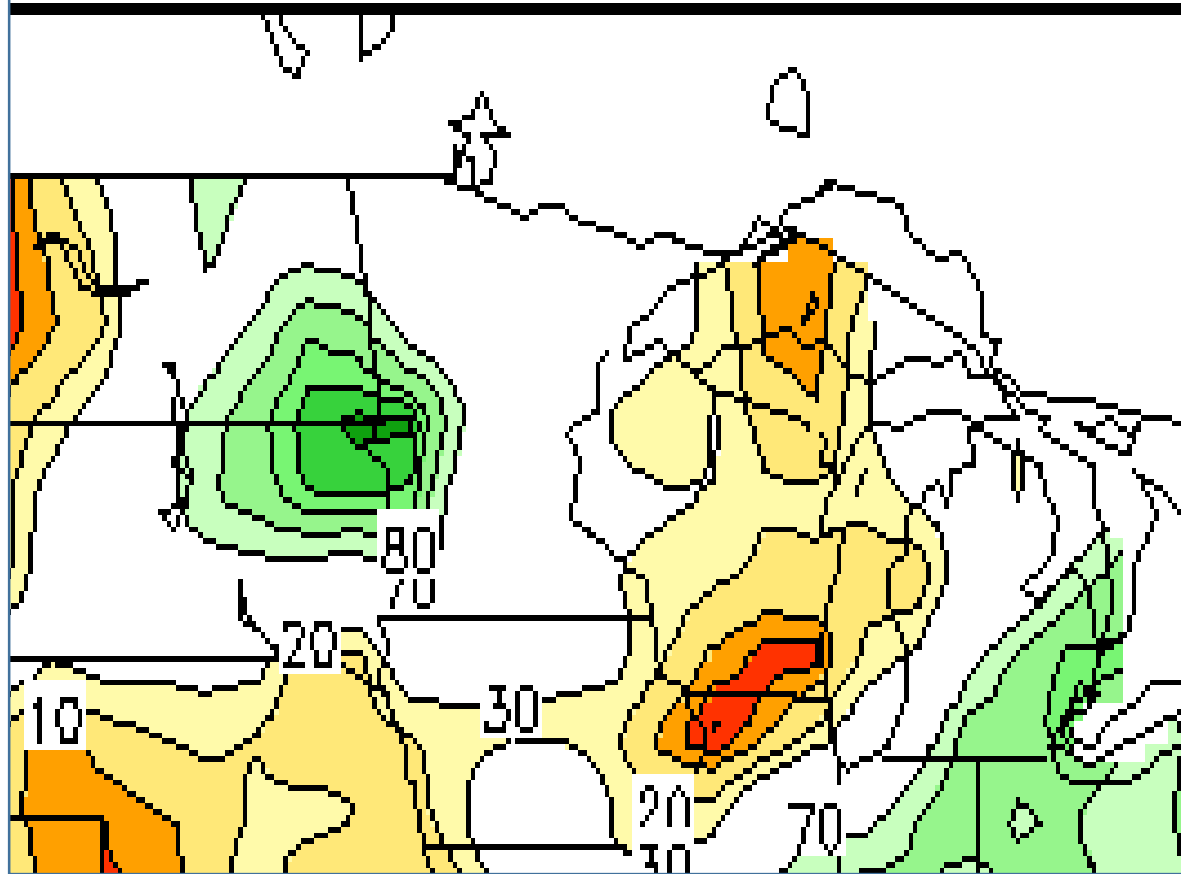
2/9/2022

Explanation - Percentile classes							
Low	<10	10-24	25-75	76-90	>90	High	No Data
	Much below normal	Below normal	Normal	Above normal	Much above normal		



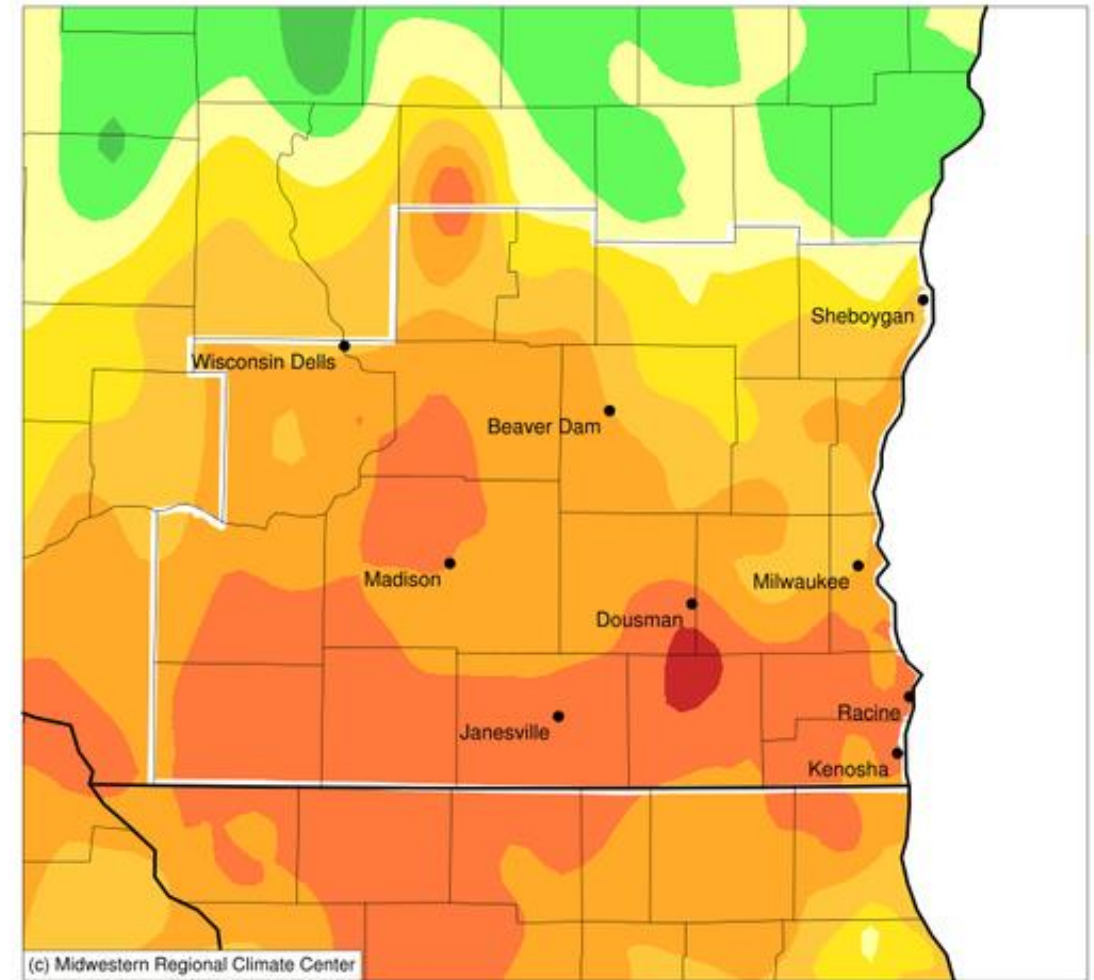
## Soil Moisture Percentile

FEB 09, 2022



## Accumulated Precipitation (in): Departure from 1991-2020 Normals

April 01, 2021 to February 10, 2022



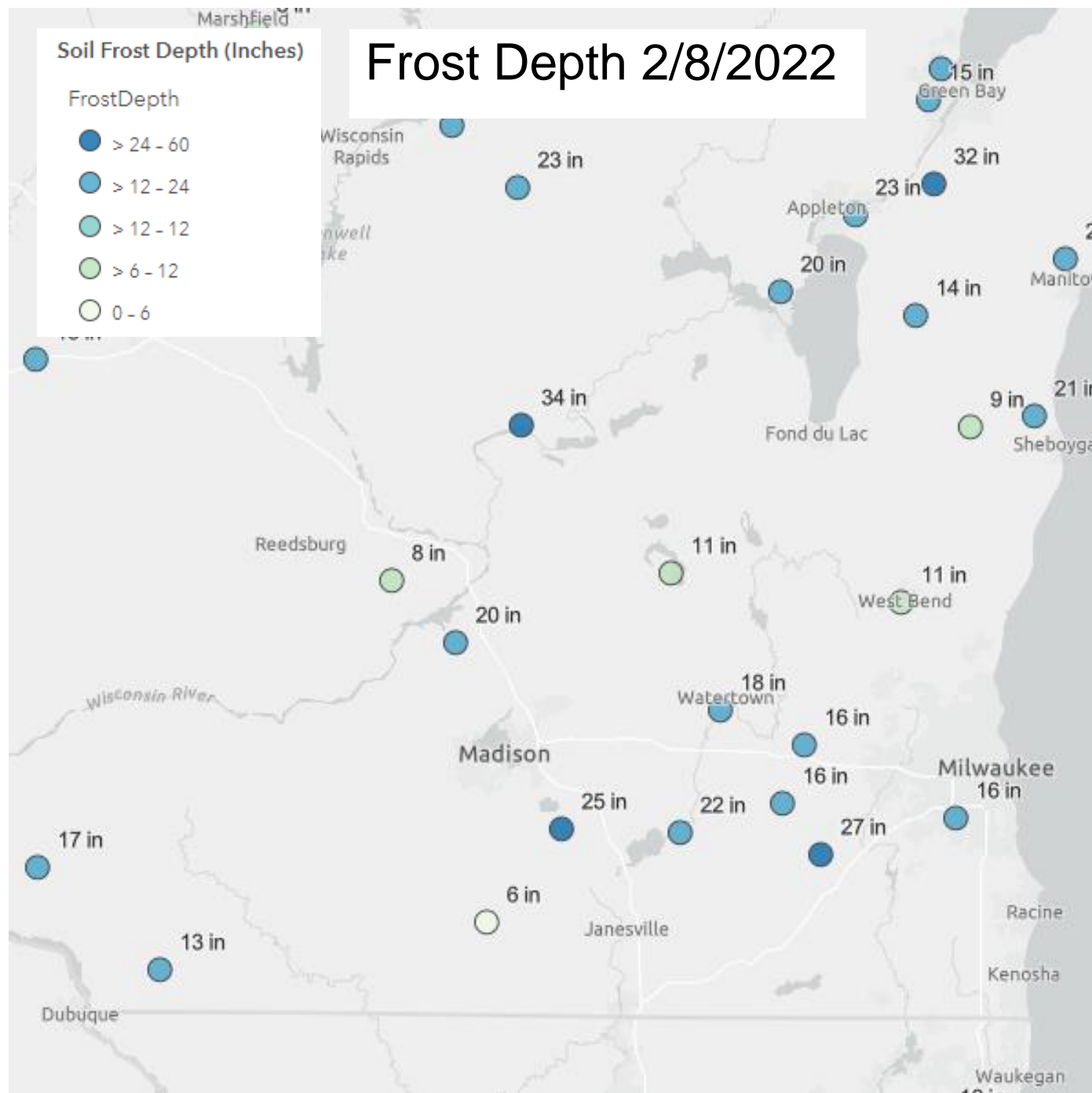
(c) Midwestern Regional Climate Center



Stations from the following networks used: WBAN, COOP, FAA, GHCN, ThreadEx, CoCoRaHS, WMO, ICAO, NWSLI, Missouri FSA, Missouri Mesonet, Midwestern Regional Climate Center  
cli-MATE: MRCC Application Tools Environment  
Generated at: 2/10/2022 3:17:42 PM CST







# How Does This Compare to Last Year?

- **2021: Spring flood risk was above average**
  - **Deep snowpack with high liquid water content, average to high stream flow, and average to high soil moisture, forecast wet spring**
  - **Didn't get much additional snow, had a slow snow melt during two weeks of dry weather. Some flooding occurred but could have been worse.**



# For The Next Week

- **Highs 30s-40s, Lows below freezing**
- **Some precipitation possible middle to late part of next week**





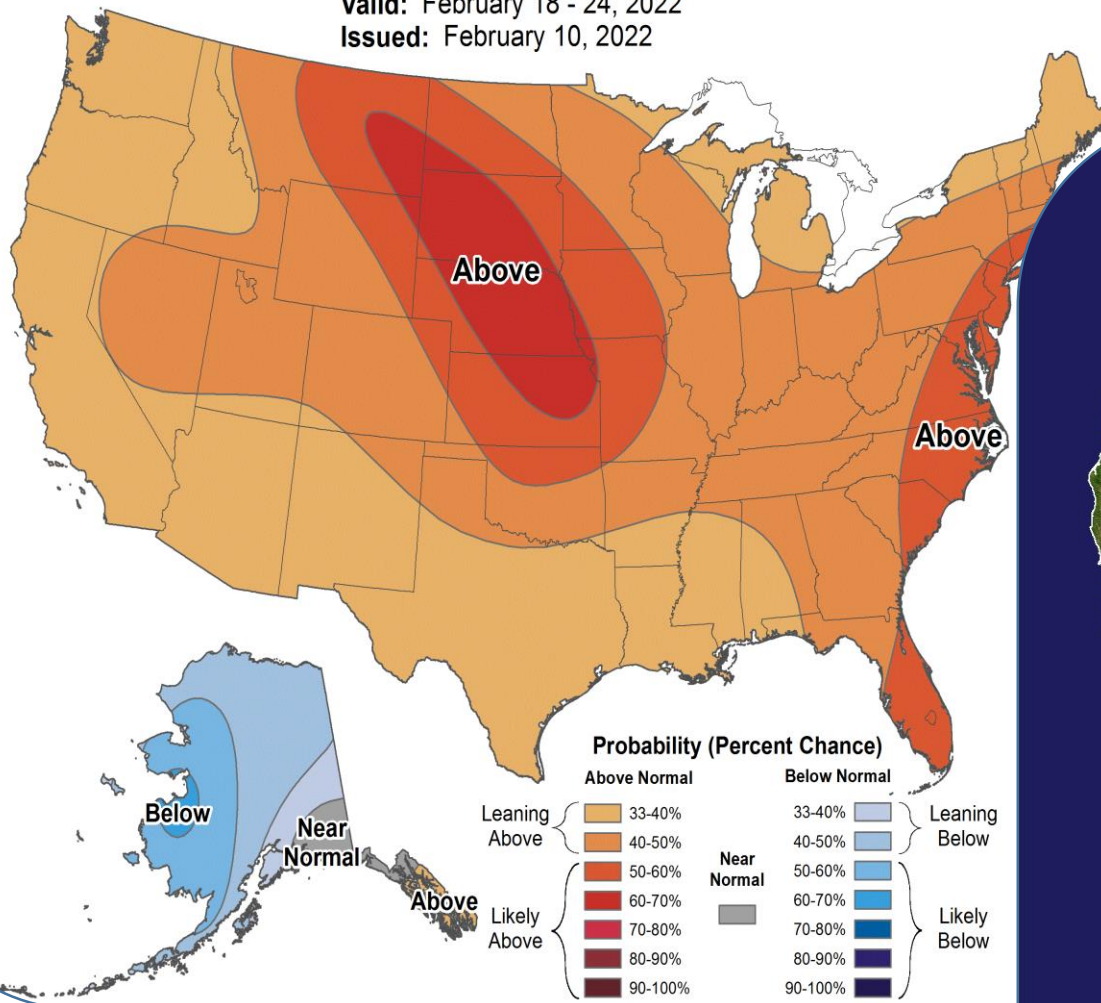


# 8-14 Day Temperature Outlook



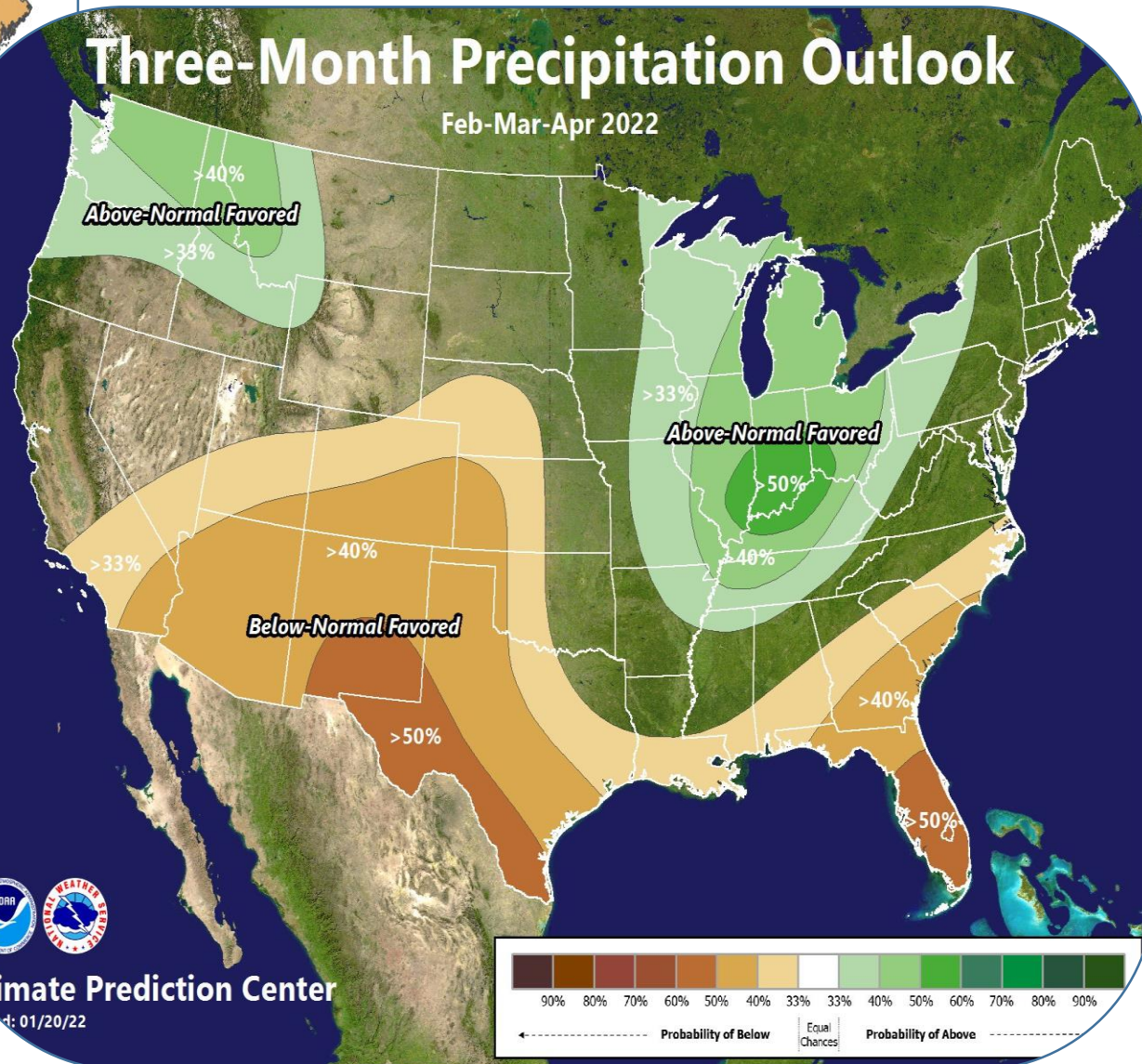
Valid: February 18 - 24, 2022

Issued: February 10, 2022

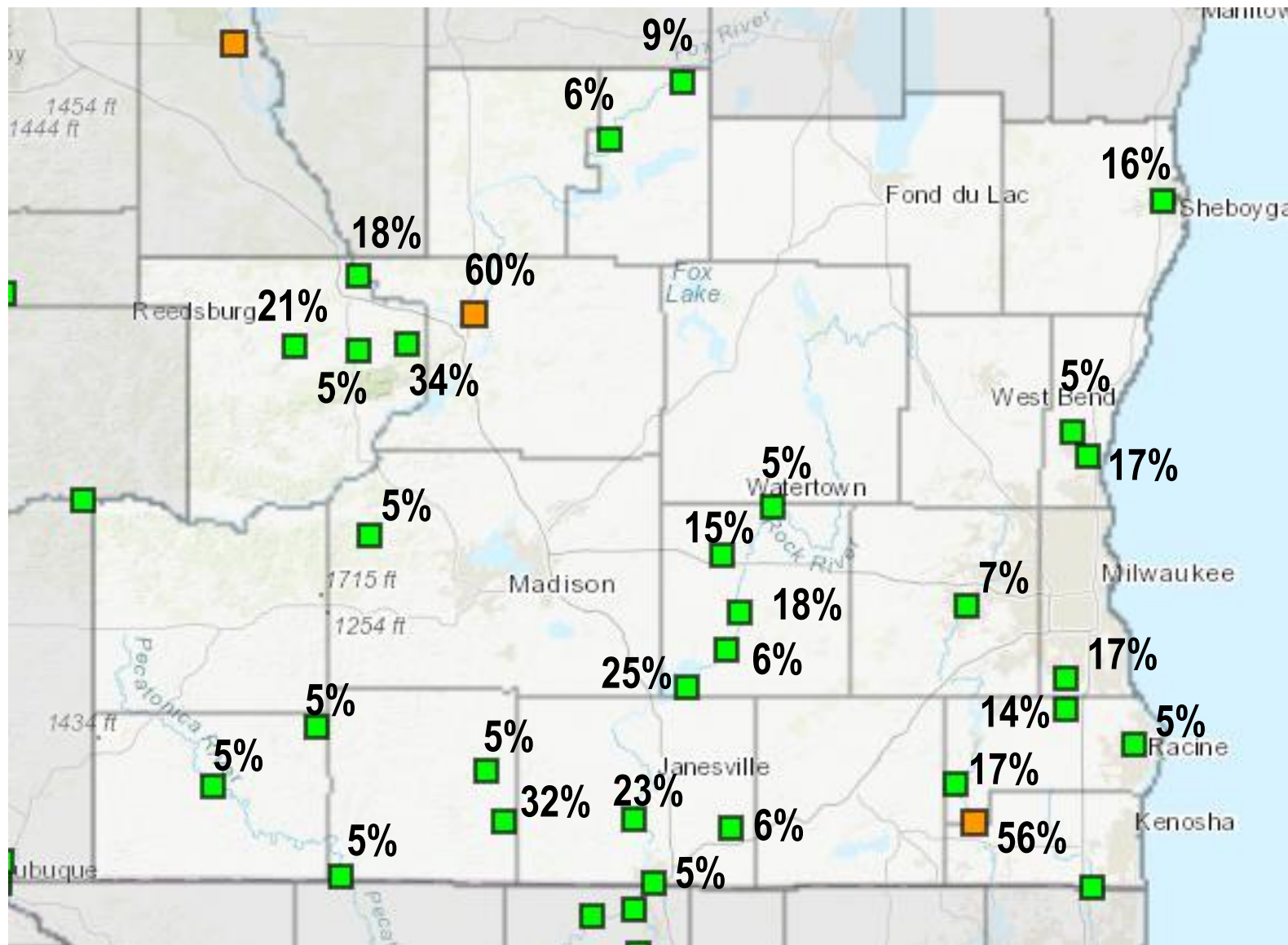


# Three-Month Precipitation Outlook

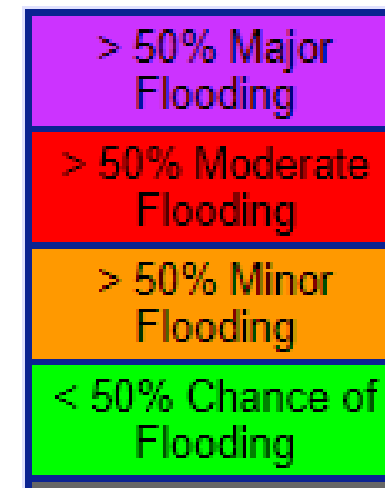
Feb-Mar-Apr 2022



# Chance of exceeding Minor Flood stage during Feb-March-April Season



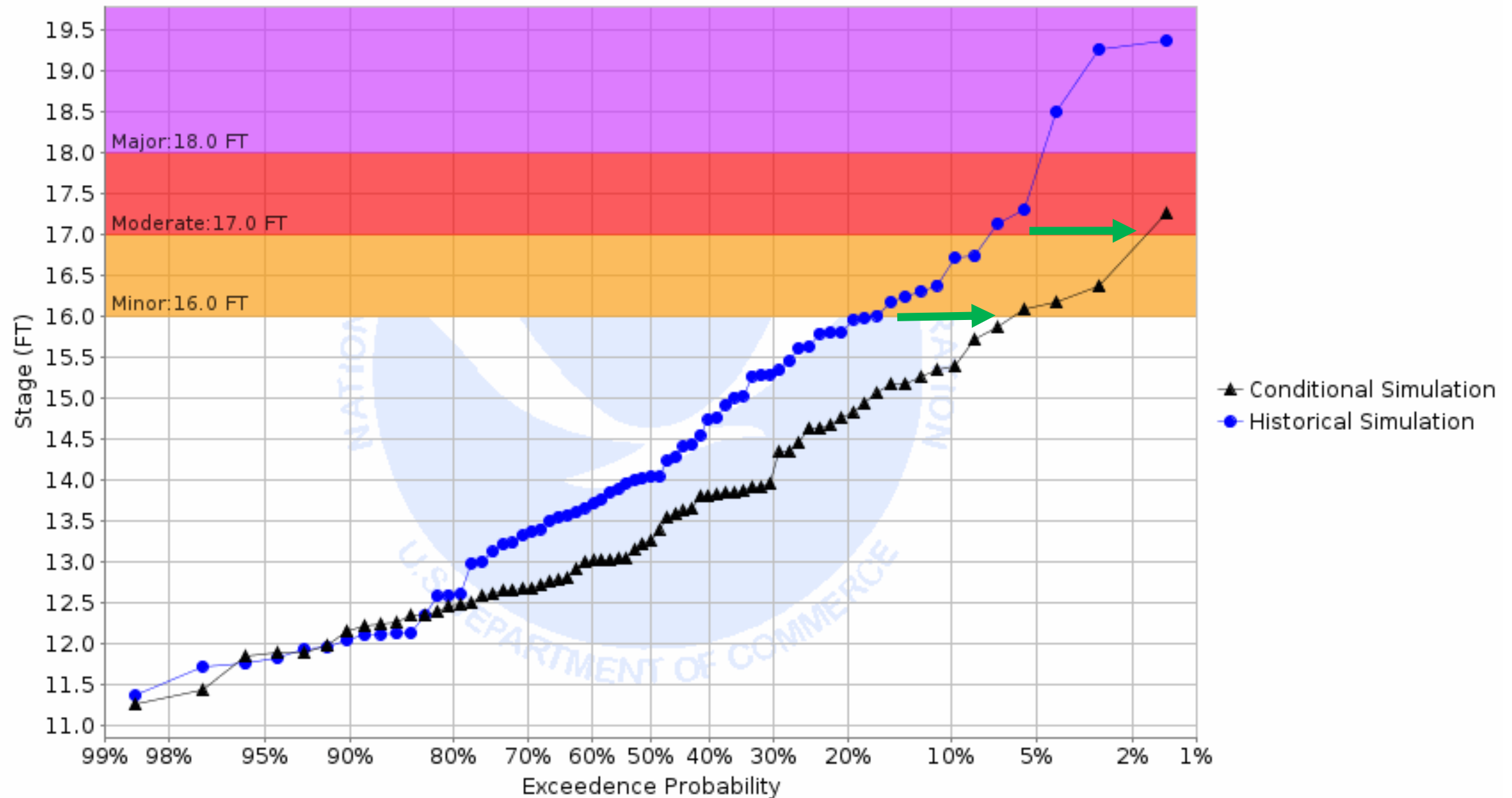
Greater than 50% chance of exceeding flood levels during March-April-May Season







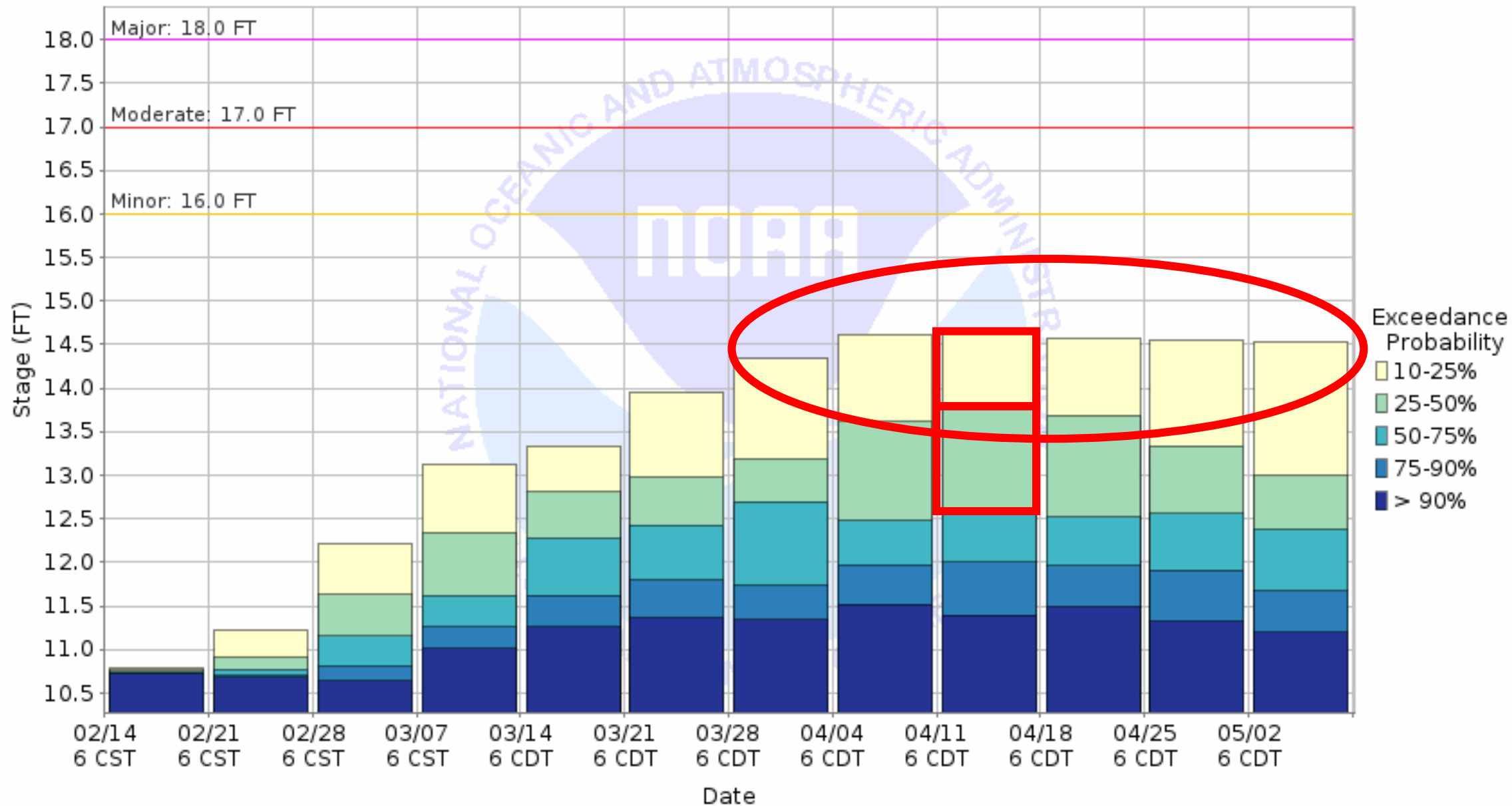
Chance of Exceeding River Stage at Rock River at Fort Atkinson (FATW3)  
Forecast for the period 02/14/2022 - 05/15/2022  
This is a conditional simulation based on the conditions as of 02/07/2022







Weekly Chance of Exceeding River Stage at Rock River at Fort Atkinson (FATW3)  
Forecast for the period 02/14/2022 - 05/15/2022  
This is a conditional simulation based on the conditions as of 02/07/2022



# How To Find the Probability Info

## NWS Forecast Office Milwaukee/Sullivan, WI

[Weather.gov](https://www.weather.gov/milwaukee) > Milwaukee/Sullivan, WI

Milwaukee/Sullivan, WI

Weather Forecast Office

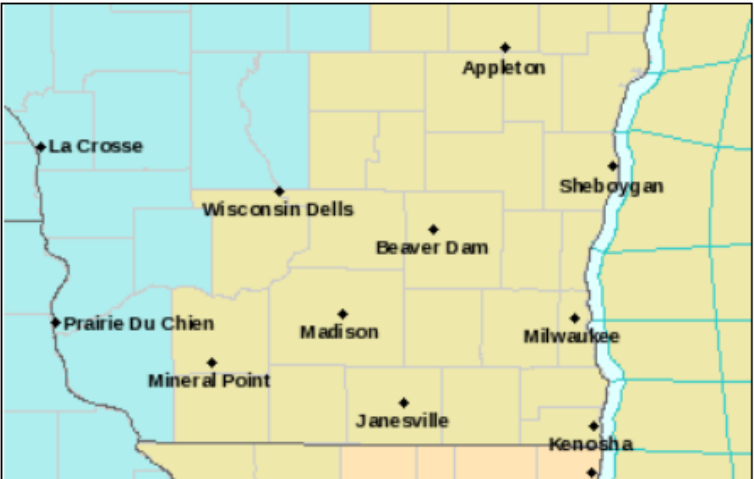
[Current Hazards](#) [Current Conditions](#) [Radar](#) [Forecasts](#) [Rivers and Lakes](#) [Climate and Past Weather](#) [Local Programs](#)



### RADAR UPDATE 7:25 AM

Snow starting to end from west to east. However, morning commute. Only minor additional accumulation.

Click a location below for detailed forecast.

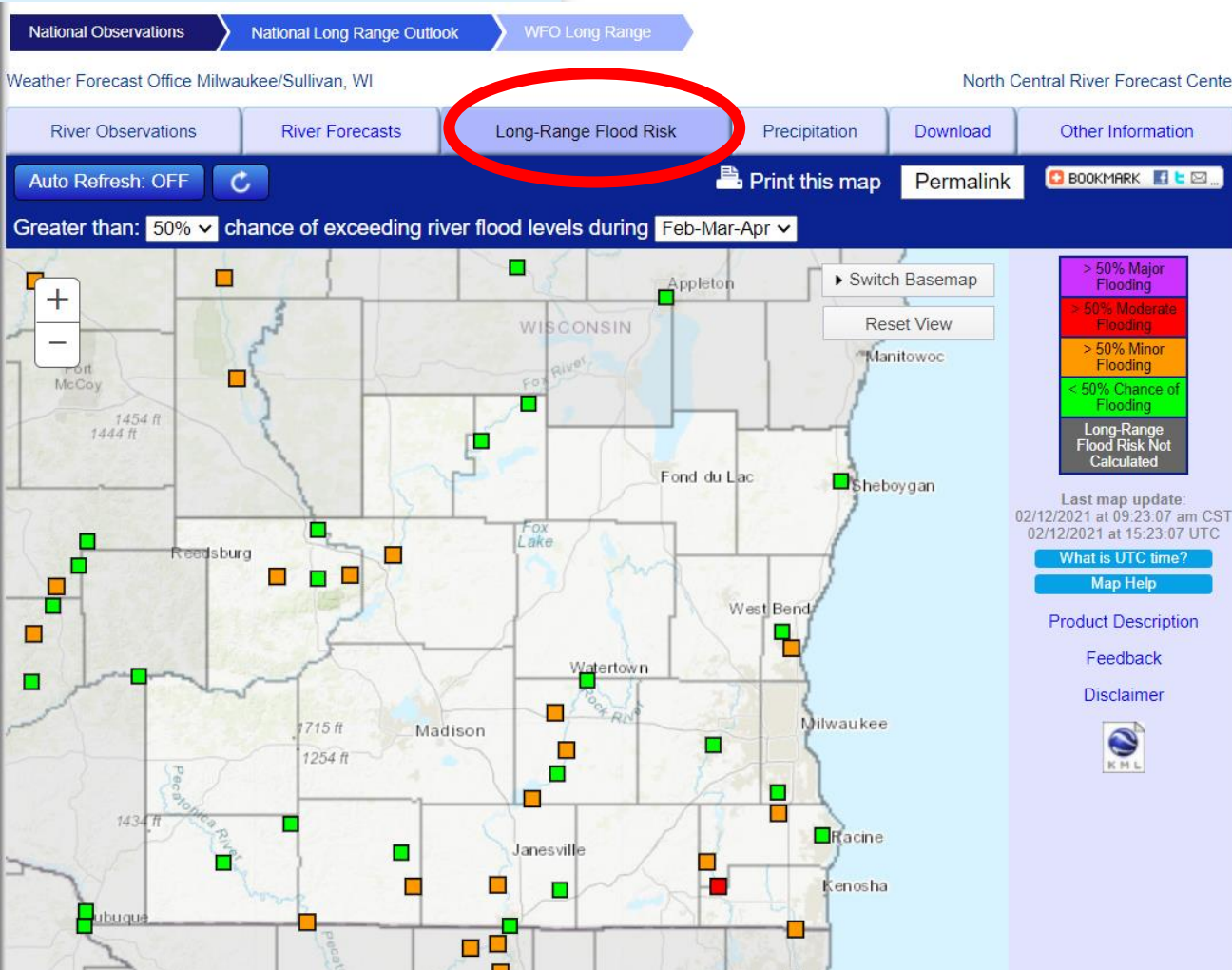


[Watches, Warnings & Advisories](#)

[Wind Chill Advisory](#)

[Special Weather Statement](#)

[Hazardous Weather Outlook](#)





# National Weather Service

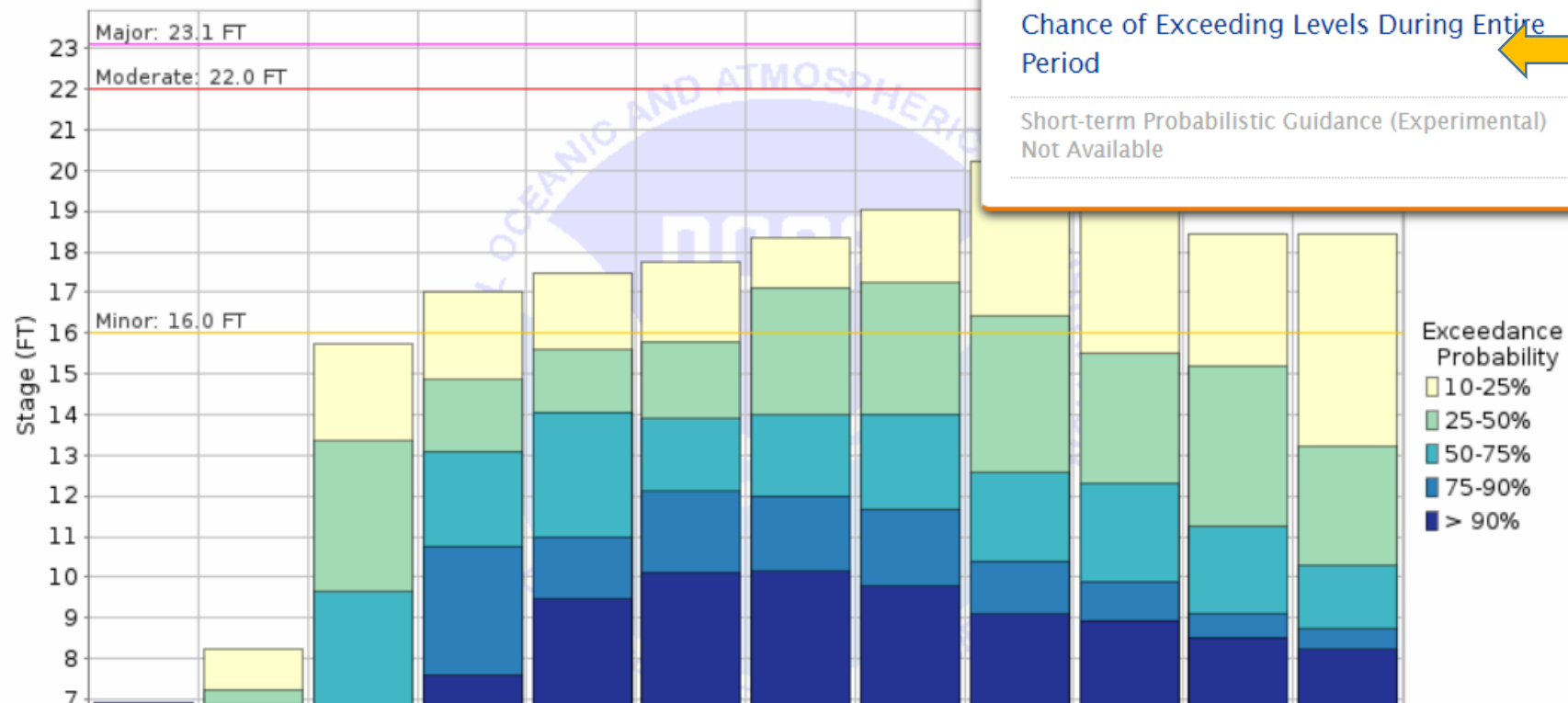
## Advanced Hydrologic Prediction Service

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This probabilistic forecast is issued by the North Central River Forecast Center

[Hydrograph](#)[River at a Glance](#)[Download](#)[Probability Information](#)

Weekly Chance of Exceeding River Stage at Baraboo River a  
Forecast for the period 02/15/2021 - 05/1  
This is a conditional simulation based on the condition

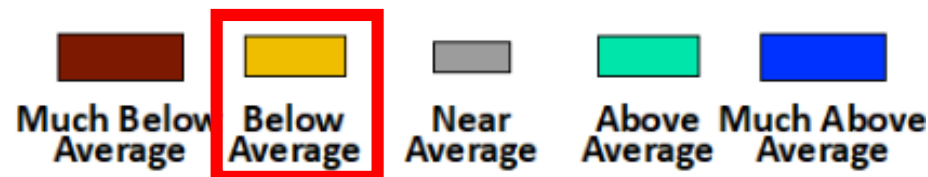


Weekly Chance of Exceeding Levels

Chance of Exceeding Levels During Entire  
PeriodShort-term Probabilistic Guidance (Experimental)  
Not Available



# Key Points



- **Spring flood risk is slightly below average across all of southern Wisconsin**
  - Main factors are below normal snow pack and dry soils
  - Additional snow pack will increase this risk
  - Flooding is possible with rain on frozen ground
  - Greatest risk of flooding occurs with snow melt and moderate to heavy rain
- **Break up ice jams possible: Risk is Low to Medium**

**Next Update:  
February 24**

**Questions?**

**Sarah Marquardt, Senior Service Hydrologist  
NWS Milwaukee/Sullivan  
Sarah.Marquardt@noaa.gov**

